R E P O R T R E S U M E S

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COMPENSATORY EDUCATION IN THE EQUALIZATION OF EDUCATIONAL OPPORTUNITY--A SUMMARY EVALUATION OF COMPENSATORY EDUCATION, SOME MODELS FOR ITS IMPROVED APPLICATION AND SOME PROJECTED COSTS OF THEIR IMPLEMENTATION. A REPORT TO THE U.S. COM. ON CIVIL RIGHTS.

BY- GORDON, EDMUND W. JABLONSKY, ADELAIDE
YESHIVA UNIV., NEW YORK, N.Y., ERIC CLEARINGHOUSE

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IN THIS REPORT TO THE COMMISSION ON CIVIL RIGHTS, THE NATURE AND IMPACT OF EXISTING COMPENSATORY EDUCATION PROGRAMS ARE EVALUATED, GENERAL CRITERIA FOR THE SUCCESS OF SUCH PROGRAMS ARE DETERMINED, AND THE COST FOR IMPLEMENTATION OF EFFECTIVE PROGRAMS IS ESTIMATED. AFTER A REVIEW OF NINE CURRENT COMPENSATORY PROGRAMS THE REPORT CONCLUDES THAT PRESENT COMPENSATORY PRACTICES DO NOT SUFFICIENTLY IMPROVE ACADEMIC ACHIEVEMENT IN DISADVANTAGED STUDENTS. HOWEVER, CONTRARY TO THE OPINIONS OF MANY, SCHOOL INTEGRATION, WHILE HIGHLY DESIRABLE, DOES NOT REALLY SOLVE THIS PROBLEM, AND DELAYING ACTION UNTIL THE SCHOOLS BECOME DESEGREGATED COMPOUNDS THE EXISTING EDUCATIONAL DEFICIENCIES OF POOR CHILDREN. WHAT IS SUGGESTED IN THIS REPORT, THEN, IS A COMPREHENSIVE MODEL FOR INTEGRATED, QUALITY EDUCATION BASED UPON TEN SPECIFIC CRITERIA FOR EFFECTIVE INSTRUCTIONAL PROGRAMS. THIS PROGRAM WOULD BEGIN WITH INTENSIVE AND EXTENSIVE EARLY CHILD CARE SERVICES, AND WOULD FOLLOW THE INDIVIDUAL THROUGH PRIMARY, ELEMENTARY, AND SECONDARY SCHOOLS. THE MODEL OPTIMALLY INCLUDES STUDENTS FROM ALL BACKGROUNDS BUT PRIMARILY POOR CHILDREN WHO CANNOT ACHIEVE ACADEMIC COMPETENCE AT EXPECTED AND NECESSARY LEVELS. THE PROGRAM INCLUDES AN EXTENDED SCHOOL DAY, WEEK, AND YEAR, AND PROVIDES SOCIAL, HEALTH, AND OTHER WELFARE SERVICES. IT ALSO PROVIDES FOR WORK EXPERIENCE AND RESIDENT CAMPING FOR OLDER YOUTH. THE ESTIMATED COST OF SUCH A PROGRAM FOR THE EXITNG 30.4 MILLION DISADVANTAGED CHILDREN ALONE IS $101 BILLION A YEAR. HOWEVER, THE EQUALIZING OF EDUCATIONAL OPPORTUNITY SEEMS NOT TO BE A NATIONAL "PRIORITY GOAL," AND THE OBTAINING OF FINANCIAL ASSISTANCE WILL NOT BE EASY. (LB)

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A REPORT TO THE UNITED STATES COMMISSION ON CIVIL RIGHTS

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
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COMPENSATORY EDUCATION

IN THE

EQUALIZATION OF EDUCATIONAL OPPORTUNITY

A Summary Evaluation

of Compensatory Education, Some

Models for Its Improved Application

And Some Projected Costs of Their Implementation.

Edmund W. Gordon, Director
Adelaide Jablonsky, Associate Director
ERIC - Information Retrieval Center
on the Disadvantaged
YESHIVA UNIVERSITY
NEW YORK, NEW YORK

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INTRODUCTION

Three questions concerning compensatory education constitute the principal foci of this paper:

1. To what extent have compensatory education programs changed patterns of educational achievement in children disadvantaged by economic and ethnic status?
2. What program elements and conditions seem essential to the success of compensatory education for such children?
3. What would it cost to implement such program elements and conditions?

Compensatory education is a term which has come into use since 1960 to refer to those pedagogical efforts directed at overcoming or circumventing assumed deficiencies in the background, functioning and current experiences of children from economically deprived, culturally isolated and/or ethnically segregated families. A wide variety of elements have been introduced under this banner. They include: 1) Modifications in training, recruitment and utilization of staff; 2) remedial reading and language development; 3) enrichment and modification of curriculum; 4) expanded guidance services; 5) enrichment of extracurricular activities; 6) increased parental and peer involvement; and 7) extended reciprocal involvement of school and community. Particular emphasis has been given to the prevention and salvaging of school drop-outs and to the preparation for school through preschool programs. Although most of these programs have concentrated on improved or increased cognitive input, some have sought to introduce affective experiences or affect laden materials designed to improve self-concept

and motivation. Unfortunately, despite the wide acceptance of compensatory education models and the enthusiasm with which some of these programs have been heralded, when one looks at their impact on academic performance in the target population it is obvious that compensatory education as presently practiced is either insufficient or irrelevant to the needs of disadvantaged young people who are not making it in academic settings. There are some aspects of compensatory education which seem to have some promise with some children. There are other aspects projected - but not yet tried - which would logically seem to have good potential for success. Some of these more promising elements are in the direction of what we might expect excellent programs of education to be. Others are in the direction of what we might expect of a good and humane social order - "The Great Society." Both of these utopian but obtainable goals are costly in terms of material resources and humanitarian concern; however, they may be prohibitive in cost in competition with distorted national values.

In this paper we have reviewed a number of primary and secondary sources for data and information concerning the nature, effectiveness and cost of compensatory education. From identifiable programs and practices, from implicit needs and theoretical projections we have outlined what might be an adequate program. From too limited information and even more limited experience we have estimated the cost of such a program based upon the cost of present efforts.

Section I: Evaluation of Current Programs

The several programs of special education for the disadvantaged have been described as compensatory since they are usually attempts to compensate, to make up for or to overcome, the effects of hostile, insufficient, different and/or indifferent conditions of prior experience and stimulation. The aim of these programs is to bring children from these backgrounds up to a level where they can be reached or served by existing educational practices. To the degree that these young people improve in academic achievement and approach the mean age-grade achievement levels established for the general population, compensatory education would be said to be effective or successful. It has been this standard which has guided practically all of our efforts at evaluating compensatory education.

For all of these programs the question is asked, "What changes can be observed in the academic achievement or intelligence test scores of the children served?" Although many aspects of these programs have been directed at other categories of function, and despite the growing skepticism that cognitive function is the optimal system through which immediate gains are reflected, the prime criterion of success or failure of these programs is academic achievement. Whether one likes this circumstance or not, it is at least understandable since the central public push of these programs has focused on bringing these children up to levels of performance comparable to those of the children with whom the school feels it succeeds.

PROJECT HEAD START

The largest compensatory education program undertaken to date is Project Head Start. This nationwide program has served almost one million children since its inception. It was designed to take young children, just prior to school entry, and through a broad based program of educational, medical and social services to better prepare them for primary school. Despite the broad based program, the many efforts at evaluating the impact of this program on children have emphasized changes in intelligence scores. These evaluation efforts have resulted in varying findings.

In general, the test scores of children served by the program have been higher at the end of the program than they were when the children entered. When compared to expected growth patterns, the Head Start children tended to be performing better than would have been expected without the program. When compared to children not served by Head Start, the children in the program tended to show better progress. There were, however, many instances in which Head Start children showed no significant differences in scores from children not served, but the dominant trend was in the direction of improved performance for the children served.

In several attempts at determining the persistence of these gains, equivocal findings are reported. In some of these studies children served by Head Start continued to show higher achievement levels

throughout the first grade (the longest period reported so far). At the other extreme are studies which indicate no persistent difference in achievement levels after two, four or six months in kindergarten or first grade. In the latter studies, often cited when "fade out" is discussed, it should be noted that it is the difference between the two groups that fades and not the prior gains. Equalization of performance seems to be a function of the non-Head Start children's having caught up rather than Head Start children's having lost some of their developmental gains.

After reviewing almost 100 major and minor studies of Head Start as an approach to compensatory education, it is clear that the introduction of broad based but highly diversified services at the three to four year old level is associated with some gains in intellectual function for the population served. These gains are reflected in higher performance levels for these children than for children not served. The persistence of these gains is not consistent. Subjectively assessed changes in social-emotional maturation and general readiness to benefit from the formal learning experiences of the primary school are more universally reported and are perceived by teachers as being more persistent. However, the long term impact of Head Start as an antidote to the destructive influence of poverty and inferior status on educational and social development is yet to be established.

TITLES I AND III ESEA PROJECTS

A second category of program is that which has developed with support from Titles I and III of the Elementary and Secondary Education Act. With even more diversity with respect to program elements and quality than is true of Project Head Start, this program has been directed at improving the capabilities of the schools, in areas where disadvantaged children are concentrated, to meet their special needs and problems. The legislation and regulations give the states and school systems wide degrees of freedom to develop programs and resources directed at the needs of poor children. Most of the eligible school systems have eagerly accepted the challenge to do something for the disadvantaged. Some have mounted elaborate programs. Practically all of the 50 states have done something under one or both of these titles.

Reports on these efforts are available for 1965 and 1966. The review of these data is not encouraging. The reports indicate that: (a) in most instances money was made available in such haste as to limit the quality of planning and development of programs; (b) many programs have been operative for too brief a period to be effectively evaluated; (c) many programs were funded at levels insufficient to the requirements necessary to do an adequate job; (d) most programs could not find adequate and appropriate specialized personnel to mount major efforts; and most programs were unable to report appreciable improvement in academic achievement for the target populations.

Among programs reporting positive findings, the tendency was toward improved morale, higher teacher expectation, improved staff-perceived climate for learning, improved attendance and reduced school drop out rates. These gains are not to be demeaned. But the development of compensatory education under support from Titles I and III has not yet resulted in a major change in the schools' success patterns with children from disadvantaged backgrounds.

UPWARD BOUND

Upward Bound is a national program designed to assist and increase the number of disadvantaged youth who enroll in some sort of post-secondary education. The program's primary focus is on developing interest in higher education among 10th and 11th grade pupils from poor families.

In the summer of 1965 pilot programs were conducted on 18 college campuses. In 1966 the program was expanded to include 215 colleges, universities and residential secondary schools. Elements common to these programs are (a) a six to eight week residential summer phase designed to remedy poor academic preparation and increase the pupils' possibilities for acceptance and success in college and (b) a follow-up phase conducted during the regular academic year which is designed to sustain the gains made during the summer months. In general, both phases include academic content that does not make an attempt to parallel the regular secondary school work. Both phases also include cultural enrichment experiences designed to increase total effectiveness.

Data from six of the original programs indicate that 80% of the students enrolled continued their education; 78% of these students entered college. Data on their success in college have not been reviewed, but from a similar group of students in a program of the National Scholarship Service and Fund for Negro Students, there is reason to expect that college completion and achievement patterns for these youth will be superior to expectations for comparable but untreated youth.

SCHOOL DROPOUT PROGRAMS

In the early 1960's considerable national attention was directed at the problems of the school drop out. In the summer of 1963 President Kennedy set into motion a large scale national campaign focused on 63 of the larger cities in this country. Almost 60,000 young people were contacted in that initial effort. Other school drop out projects have expanded on that crash program. They have generally been organized by high schools, community groups and by private industry. These projects have included intensive guidance services, remedial education, specific job training in and out of formal school settings and large scale "Stay in School - Return to School" publicity campaigns.

Data on the initial effort in 1963 indicate that 52% of the youth contacted actually returned to formal school affiliations. National figures on the total effort subsequent to that time are not available.

The need for large scale programs which combine intensive guidance services with remedial education, specific job training and remunerated work is clear. A review of the nation's attempt at doing this indicates that money and resources, when applied, are seldom sufficiently concentrated to achieve the obvious goal.

PROJECT 100,000 UNITED STATES DEPARTMENT OF DEFENSE

Project 100,000 was designed as an attempt by the armed services to become involved with and help to alleviate social and educational problems of the poor. In October 1966, 40,000 young men were taken into the armed services under lowered entrance standards. These men fall between the 10th and 30th percentile on Defense Department qualifying tests.

The 40,000 soldiers were tested in July on the Metropolitan Word Recognition, Reading and Arithmetic Fundamentals sections. The average was grade 6.5 on word recognition and arithmetic fundamentals, and grade 6 on reading. Seventeen percent of this group were reading below the 4th grade level.

The first program which is basic training takes 8 weeks for the majority of soldiers. In the total army population 98% of these are expected to pass the performance and academic tests given at the end of the program. Of the 2% that fail, one-half fail because of medical reasons.

In the special program, 95% are expected to succeed in passing the performance and academic tests. However, about 8% of this group require re-cycling, that means doing a week or several weeks' work over again, before they can be passed; 4% are discharged for physical and academic reasons.

After basic training some soldiers are sent directly into a combat area; most go through advanced training. For many of these advanced training courses, the language used by the instructors and in printed materials has had to be simplified in order to accommodate the program to the low reading level of these soldiers. In addition to the change in language, there are programmed texts in basic arithmetic skills, video tape and simulators with which it is hoped that soldiers will be trained to do a specific job in the service. For the individuals in this project, however, instructors in the practical courses such as automobile mechanics take the slow learners for after-hours tutoring. This tutoring may include either mechanical or basic academic assistance. In a recent speech Secretary McNamara indicated that the earlier estimates of anticipated success were in general consistent with the performances of these men.

BANNEKER PROJECT OF ST. LOUIS, MISSOURI

"Operation Motivation" was initiated in the Banneker School District of St. Louis, Missouri in 1957, under the direction of Samuel Shepard. The program is an attempt to raise the academic achievement of children

in kindergarten through eighth grade by concentrating on attitude change on the part of pupils, teachers and parents rather than through specific curriculum modification.

The Banneker Project attempted to appeal directly to the sense of pride and competitive spirit of the pupils. Techniques employed were pep rallies, honor assemblies, competition contests, a radio program giving children suggestions on "how to succeed in school" and ungraded classes with heavy emphasis on reading. Teachers were encouraged to give pupils a sense of the direct relation between present day school work and future employment, to "quit teaching by I.Q....quit their attitudes of condescension...assign home work...and visit the homes of the parents." Meetings were held with parents at which they were persuaded to look forward to a better future for their children and to inspire their children to regard school as the best means of self-fulfillment and upward mobility.

In the evaluation of the Banneker Project, student performance was compared with national norms and with norms found in other nearly all-Negro and all-white schools. A comparison of eighth grade reading levels shows that students at the Banneker schools made a slight improvement after three years, but reverted back to their original position of at least a year below the national average. When compared with other all-Negro schools, the Banneker schools' academic standing showed no advance during the Project years. In 1965-66 the position of the Banneker schools relative to nearly all-white schools remained

inferior. Dr. Shepard, looking at more than academic achievement test scores, has reported that the children have been more interested in school, have been better behaved and have better attendance, that teachers have been working harder, and that there has been excellent cooperation from parents.

MORE EFFECTIVE SCHOOLS PROGRAM OF NEW YORK, NEW YORK

The "More Effective Schools" Program was initiated in 1964 in ten New York City elementary schools and expanded in September 1965 to include eleven additional city schools. The Program was intended to create basic changes in curriculum, personnel, school plant and organization and school-community relations. Specific program elements were to include provision of teacher specialists, team teaching, reduced class size, heterogeneous class grouping, and intensive work with parents and community.

An evaluation of the More Effective Schools Program was completed recently. Perhaps the most important finding of the study was that despite certain administrative and organization changes, "little has happened in the way of innovation or restructuring in the basic teaching process." There was general agreement among both observers and school staff that "teachers have not revised techniques of instruction to obtain the presumed instructional advantages" of reduced class size and the availability of specialized services.

While reviewing the data on cognitive and attitudinal changes in ME classes, one must note both the provision of reduced teacher-pupil ratios and specialized psychological, social and health services and the absence of any radical revision in instructional practices. On the basis of both standardized tests (of reading and mathematics) and classroom observations, children in ME classes made no more achievement gains than children in designated control schools or in other special service schools. Moreover, after three years of the Program, the retardation below the urban norms used for reading was no better, and in some cases was worse. The data also reveal that, even in the cases where the Program had a positive effect on achievement, gains were not maintained beyond the first year and sometimes not even across the summer.

Despite the lack of measured cognitive gains, a clear sense of "enthusiasm, interest and hope" was reported among administrative staff and teaching faculty as well as parents and the community in general. As indicated in that evaluation, "The creation of such positive feelings and climates in a school system which in recent years has evidenced considerable internal stress and school-community conflict is an important accomplishment" and, we might add, a rather ironic one.

HIGHER HORIZONS PROGRAM OF NEW YORK, NEW YORK

The Higher Horizons Program was conceived in large measure as an

extension of the "successful" Demonstration Guidance Project. The Demonstration Guidance Project involved approximately 700 junior and senior high school students in Harlem. Counseling and remedial education staffs were significantly increased at the schools involved to provide a high concentration of supplementary help. The results were quite dramatic. Approximately 60% of the students who had joined the Project in seventh grade gained an average of 4.3 years in reading achievement after 2.6 years in the Project; the drop out rate from high school for these children decreased from 40% to 20%, and a significant portion were motivated to continue their education beyond high school.

The Higher Horizons Program was an attempt to replicate the Demonstration Guidance Project on a much wider scale and at minimum extra cost. Higher Horizons was begun in 1959 to serve 12,000 children from 31 elementary schools and 13 junior high schools and was expanded in 1962 to include 64,000 children. The major purpose of Higher Horizons was to "develop techniques for the identification, motivation, enrichment and education of the culturally disadvantaged children and to perfect means for stimulating them and their families to pursue higher educational and vocational goals." The foci of the Program were intensive individual and group counseling, cultural and occupational experiences, remedial services and parent education. Several hundred specialized personnel were added to the staffs of the project schools. The extra teachers were used as curriculum assistants, teacher training specialists, or subject matter (particularly reading) specialists;

each teacher was expected to spend a good part of his time on parent and community education, cultural activities and teacher training, as well as curriculum improvement and remedial work.

Any evaluation of the Higher Horizons Program must take into account that at least as far as budgeting was concerned, the Program was not supported financially to the extent originally planned. For example, in 1959 one additional teacher or counselor was provided for every 108 children, but by 1962 there was only one teacher or counselor provided for every 143 children. On a per capita basis, more than three times as much money was spent on the Demonstration Guidance Project as on Higher Horizons. In 1964 an evaluation was completed for the New York City Board of Education. The study concentrated on students in eight Higher Horizons schools matched on a one-to-one basis (of I.Q., reading comprehension, ethnic composition, geographic location and size of school) with non-Higher Horizons students. For the period of the study (1959-62) the Higher Horizons schools had a somewhat smaller average class size, lower rates of pupil and teacher transiency and larger percentages of regular teachers. The evaluation reported that there were no significant differences between Higher Horizons and control group children on reading and arithmetic achievement, ratings of school attitudes, self-image and educational-vocational aspirations. The only significant differences noted were gains made by Higher Horizons elementary school children in arithmetic. Despite these disappointing results, the professional staff in the program were observed to be favorably disposed to the Program. They

felt that it was most successful in providing cultural opportunities and extra remedial guidance services and that its least effect was on students' behavior, study habits, and educational goals.

PROJECT CASE II: MODEL

NATIONAL TRAINING SCHOOL FOR BOYS OF WASHINGTON, D. C.

The Institute for Behavioral Research began its project Case II: MODEL (Contingencies Applicable to Special Education-Motivationally Oriented Designs for an Ecology of Learning) in February, 1966 under the direction of Harold Cohen. Twenty-eight young men in the National Training School for Boys were involved. The basic goals of the project were to increase the academic behavior of all twenty-eight and to prepare as many as possible within a one-year time schedule for their return to school. The age range of the group was fourteen to eighteen, their average I.Q. was 93.8, 85% were drop outs from school, and only three had never been sentenced and institutionalized before.

Case II was based on the idea that each learning experience should have built into it a series of reinforcing steps to maintain the student's interest. This meant direct tangible reinforcement as well as an individual sense of success and group approval. Cohen used money as an extrinsic immediate reinforcement -- "...our student-inmates want to know, 'Man, what's the payoff now?' For them, as well as for the bulk of Americans, they work for money." Each student became an Educational Researcher and went to work on 140

programmed educational courses and 18 programmed classes. When they performed on tests at 90% or better, they were paid off. A point system was utilized, each point representing one penny. With his money earned, the student provided for his room, food, clothing, gifts and an entrance fee and tuition for special classes. "A student who does not have sufficient funds goes on relief -- sleeps on an open bunk and eats food on a metal tray. No student has ever been on relief more than two weeks."

A specially designed 24-hour contingency-oriented educational laboratory was designed to provide, in effect, 24 hours of educational therapy. "Where and when a student sleeps, eats, makes contact with another student, with a machine, with a group, a program or a teacher is part of the educational ecology.... Every student in this program is being counseled by those people he selects during the day. He talks to his friends, to the librarian, the teacher, the cook, the secretary, the research staff and visitors. He can select a particular counselor on request, e.g., his minister, psychologist or caseworker, for which he pays a small professional service fee."

The vital aspect of the structured environment is that it programs the individual for success. This is attained basically by (1) structuring each curriculum unit at a level where the individual can perform successfully step by step; (2) providing direct pay-off for achievement. This work is primarily directed at developing new and more appropriate behaviors under a schedule of reinforcement while eliminating

inappropriate antisocial behaviors by a schedule which is non-reinforcing.

Cohen's intermediate findings are quite impressive. Increases of the I.Q.'s of the students have averaged 12.09 points. For every 90 hours of academic work, there was an average increase of 1.89 grade levels on the Stanford Achievement Test and 2.7 grade levels on the Gates Reading Survey.

SECTION II: General Criteria and Promising Models

The rather modest success of these and many other efforts at compensatory education, when combined with the Coleman findings indicating that school factors account for a small amount of the variation in school achievement, could lead to the conclusion that improvements in the quality of education are hardly worth our effort. But just as the Coleman finding is based upon an examination of several factors which are probably not crucial in the determination of the quality of education, much that we see in the several approaches to compensatory education consists of educational features which may be necessary to the educational process, but evidently are not sufficient to make the difference in terms of greatly improved academic achievement in socially disadvantaged children. Most of these programs have either attempted to modify basic cognitive processes, to change levels of content mastery or to change the motivation of the young people served. However, most of these programs represent vast increases in the quantity of effort directed at improving function with very little improvement in the quality of program offered. The efforts directed at changed cognitive function are very traditional and have brought little that is new or changed in pedagogy. One does not see in these programs any reflection of current thinking relative to learning theory and behavioral organization. With but one exception, there is no representation in the programs reviewed of the application of behavioral analysis and contingency management to the learning experiences of these youngsters. Yet, as we have indicated, this is one of

the few approaches to compensatory education which seems to be bearing fruit. In approaching improved content mastery, the programs seem to have concentrated on either an enriched or watered-down presentation of material to pupils. Again, drastic reorganization in the presentation of material, the quality of material and the conditions under which materials are presented are not present in these programs. At the level of increased motivation and attitude change we have somewhat more promising signs in the effort of many of these programs. Several programs have sought more active involvement of parents and representatives of the communities from which these children come in the planning and conduct of educational programs. This emphasis, however, is by no means a widely accepted and dominant one. At least at the level of meaningful participation there continues to be strong resistance on the part of the education establishment. This has been particularly exhibited in recent struggles between school personnel and community groups. Despite the tradition of community control of the public school, when that control is likely to pass into the hands of poor and minority group persons the school resists strongly. If compensatory education is to compensate for the learning problems of young people who are thought to come to school without the necessary background of experience to optimally benefit from school, or of youngsters who come to school poorly motivated toward the goals of the school or of youngsters who come to school lacking certain cognitive habits and skills, and of young people who come to the school attitudinally unprepared to participate or to sustain participation in academic learning tasks, there are then several criteria which might guide the development of

compensatory education.

1. Effective instructional programs and practices must be a part of such an effort. If this is to be achieved, we will need to give greater attention to the dynamics of group interaction in their relationship to the teaching-learning process. Professionals concerned with such fields as psychotherapy and decision processes have developed elaborate systems of theory and practice based upon concepts of group dynamics. This sophistication has not yet been appropriately applied to education. Effective instruction will also require that we explore different ways of organizing learning experiences to meet individual differences in readiness and style. Readiness and style may vary with respect to the functional capacity to discriminate between things seen, heard, tasted or felt. They may vary with respect to habit patterns that have been established around these sensory functions. They may vary based upon the dominance of one aspect of sensory function over another. It may well be that children whose life experiences vary drastically may have also significant variations in the hierarchical organization of sensory function and response modalities. Furthermore, if individuals, independently of experience or station in life, differ with respect to the degree to which they are inclined to respond with one or another of the senses, it may be that one of the significant variables in learning ability and disability is the quality of support provided when the learning task presented does not complement the sensory organization of the learner.

Another emphasis deserving of attention in our efforts at more effective instruction involves the utilization of behavioral analysis and contingency management in the design of learning experiences. In another context, one of the authors (Dr. Edmund W. Gordon) has stressed the importance of qualitative as opposed to quantitative analysis of intellectual and other behavioral functions as a prerequisite for the development of prescriptions for learning. In behavioral analysis one is concerned with the detailed analysis and description of behavioral function, so that strength, weakness, style, preference, etc. are identified and a course of action for directed learning may be established. In contingency management, one is concerned with limiting the contingencies surrounding behavior, so that the possible outcomes can be controlled, making possible the anticipation of consequences of the behavior. Such understanding and manipulation permits us to tie consequences of behavior to the antecedents of behavior and to use these consequences as reinforcers of desired behaviors.

2. If effective instructional programs can be achieved, compensatory education will need to reach children earlier, serve them over longer periods of the day, week, and year, and possibly follow them later into life. This latter need may increase as the need for continued learning and instruction as lifetime processes becomes more accepted in our society. The program then must provide for intensive and extensive care from the cradle at least until productive work or college. In many instances it will need to

provide, through the school, child care and instructional services ten to twelve hours a day, six or seven days a week and twelve months of the year. If we are concerned with insulating the child from many of the destructive elements in disorganized communities and families, there is little choice but to drastically expand the periods for which the school is responsible for the child.

3. This enriched school experience will have little effect, unless it can come to be valued and respected by the children and families served. Unless involvement in the school and respect for its values can become positive norms in the lives of the children, the productiveness of the school will be impaired. There is mounting evidence suggestive of the relationship between goal determination and task involvement. It would appear that participation in the determination of the policies of schools which these children attend, by their parents and community members with whom they identify, would be positively reflected in increased commitment to the objectives and programs of the school. A corollary of this involvement is another attitudinal asset. The increasingly recognized sense of environmental control would seem also to be a potential product of this increased involvement in decision-making in school affairs. Participation in decision-making is by no means the only road to personal involvement. Of equal importance is the need that the school, the curriculum and the materials it uses provide points of identification for the learner. In this connection, materials which are widely

representative of the variety of cultural, economic and ethnic groups in this country are essential. Staff members who also represent this variety of backgrounds are a necessary ingredient.

4. If the school is to meet the special needs of youngsters who are handicapped by lower economic status, special attention and provision will need to be made to protect and insure good health, adequate nutritional status and the material resources necessary for effective school learning. In some instances, this will mean elaborate programs of health care. In other situations, food supplements will be required. In many situations, stipends may be necessary to enable the youngster to provide the necessary supplemental school materials and pocket money for minimal social interaction. For these children the school must alleviate or circumvent economic, cultural, social, experiential and educational deficiencies in their environment. Many of these are functions the school was not originally designed to perform.

5. The influence of the school is by no means limited to the period during which the youngster is responsible to the school. What the youngster perceives as opportunity to utilize the school's products and to participate in the mainstream of the society may be as important to his adjustment and progress within the school as it is to his development in the post-school period. Again, in reference to the all-important sense of environmental control, it may be that in the absence of perceived opportunity

to do something with his life, all of our innovations and educational improvements will be for naught.

6. Since so much of the school's influence is mediated through verbal interaction, its program for these children will have to reflect respect for the languages with which these children come to school. In some instances, basic education may have to be provided in the vernacular of the child until development has progressed to a point where a transition to standard language forms may be achieved.

7. Since high degrees of mobility and transiency are characteristic of many families in the target populations, special provisions to accommodate transiency must be made. This may require comparability of basic goals and programs at each level of instruction and sufficient intimacy in teacher-pupil relationships to provide for emotional and physical security particularly at points of transition. This goal can be partially achieved through the provision of sufficiently small organizational units so that each child is enabled to achieve a sense of identity and involvement in the essential aspects of the educational process. In this setting the child will need to experience a real sense that what he does and what he decides can influence his progress, achievement and future.

8. The implementation of programs which approach these criteria will to a large extent depend upon the availability of excellent school staffs. In the achievement of this goal special attention will need to be given to the preparation, supervision and circumstances of work of the school's personnel. The dimensions of the necessary training programs have not yet been specified. Wide variations are possible in the backgrounds and training of persons utilized if emphasis is placed upon supervision and accountability. Particularly in these schools, non-professionals and para-professionals indigenous to the backgrounds from which the children come should be utilized, and these persons like all other staff members should be actively represented along with non-school employed members of the target community in decision-making in all aspects of the school's functioning.

9. The school must be adequately provided for in terms of material support. For the target population, facilities and resources do make a difference. Quality of teachers is important. There must be available the monetary and status rewards necessary to attract and hold able teachers in classroom instruction.

10. Cultural, economic and ethnic integration in education are often viewed as alternatives to compensatory education. Increasingly, they must be viewed as integral parts of compensatory or quality education. Probably more efficient than all the above stated factors excellently provided would be the mixing of children from

more limited backgrounds in schools where the majority of pupils come from more privileged circumstances of life. Instead of a choice between integration and compensatory education, we advocate integration as an essential feature in compensatory education.

An Organizational Model for Compensatory Education

Within the framework of these several criteria, a comprehensive model for compensatory or quality education can be projected to meet the needs of socially disadvantaged children. The model which follows provides at the early years programs particularly for the disadvantaged. As we move into the elementary school, the plan is particularly designed for children from disadvantaged backgrounds, but optimally it should include children of all backgrounds. At the level of secondary school, our plan requires inclusion of the total population in that age group. From the design of these program elements, it is clear that the authors of this paper feel that when education is appropriate to the characteristics of the learners and adequate to the achievement of certain basic criteria of academic and social function, compensatory education and integration in education become less the issue and education of high quality available to children in relation to their need is the primary concern.

EARLY CHILD CARE: Birth through Two Years of Age

For families where economic, social and/or psychological factors make it difficult or impossible to afford the infant and young child care which insures optimal development, provisions should be made for optional services. However, these must provide, in addition to physical, nutritional and medical care, warm personal relationships and opportunities for the kinds of experiences which help to develop facility in the use of language, perceptual discrimination skills, integrated perceptual-motor functioning, conceptual problem solving skills and attitudes of appreciation for and challenge by learning.

Where the parents so elect, the child should be placed for the first two months in an extended nursery facility. The facilities should provide for an option of daytime care or around-the-clock care. They should provide an opportunity for mothers and/or fathers to visit with and remain with their children for as long and as often as they are able.

This program should be implemented by a Bureau of Child Welfare within the criteria previously established. It should provide the children of this age opportunities to develop, experience and learn to the point where within the third year of life the following achievements have been met:

1. The child has the physical coordination and skill required for walking comfortably, feeding himself and is capable of normal

control of toilet functions for this age level.

2. The child has the verbal ability and vocabulary to make his wants understood, understands simple directions from adults and has basic language facility for this age level.
3. The child has begun to show a balance between dependence and independence in his behavior, reflecting a view of the environment as phenomena to be explored, manipulated, utilized and mastered.
4. The child is judged sufficiently mature by the faculty of the school to make the transition to the primary school. Transfer to the primary school could take place on previously established dates six times during the year, so that the receiving school would begin orientation programs for newly admitted children in groups sufficiently large to permit group orientation to the structure and program of that school.

THE PRIMARY SCHOOL: Three through Five Years of Age

This school should be patterned on the present Head Start program with several alterations. Each school should be headed by a head teacher and should accommodate about 150 children, in five groups of thirty. Each group of thirty should have a head teacher, one assistant teacher, two student teachers or para-professionals and two community non-professionals. Each school should have two social workers, a nurse and a part-time psychologist.

A coordinating council should be established for each 6 to 8 schools in a neighborhood to be headed by an administrator who is not

necessarily an educator but is responsible for all the business affairs of the cluster of schools. Working with him should be a coordinator of food services and the full-time educational psychologist serving the center. A science specialist and a recreation specialist will not be based at the central headquarters but will be assigned on a rotating basis to each of the schools to work with the teachers and the children in enhancing those aspects of the program.

This school would function six days a week from before breakfast until after dinner. It would be segmented into two levels, one primarily for the three to four year olds, and the other level for children ready to make the transition at the five year old level. At both levels there should be explorations beyond the school facility itself into the community in order to learn its various elements. However, these experiences should be much more frequent and enriched at the five-year-old level.

In addition to the usual rest periods, specific blocks of time of several hours should be established for purely recreational purposes using neighborhood parks or, if necessary, providing transportation to parks for these activities when weather permits. The parks, in addition to being used for recreation, could also provide the environment for nature studies.

Transition from the lower to the upper level of this school should take place when the child is judged by the faculty to have developed

maturity, attitudes toward learning which are demonstrated by normal curiosity and desire to explore, normal problem solving skill and evidence of the concept that what the child does influences his present and his future.

At the upper level, the transition should be begun to a cognitive emphasis with a strong drive toward pre-reading and reading skills, introduction to writing and drawing, introduction to basic arithmetic and listening skills.

Transfer out of the primary school should take place four times a year. The later fives and early sixes would be transferred when they were judged by the faculty of their school to have developed sufficiently in perception, cognition, motor, emotional and social skills to adjust to the program of the elementary school.

Each executive committee of a cluster should be held accountable to a central city or school district board for the achievement and development of the children in its care. This executive committee as previously established in the basic criteria would consist of administrators, teachers, parents and community representatives.

THE ELEMENTARY SCHOOL: Six through Eleven Years of Age

While it would probably be more desirable to provide new educational structures for all children in these schools, reality forces us to

design these schools around the presently existing facilities. The utilization of these facilities, however, will require the changes indicated below. Due to the lack of sufficient facilities to provide these accommodations for all disadvantaged children, it will probably be necessary to secure other available space in apartment houses, community structures, stores, business facilities or temporary structures, until the building program can provide sufficient and appropriate space for this level.

Starting with the smallest unit, a class will consist of approximately 54 children, under a master teacher, further subdivided into two groups of approximately 27 children each, each with a fully licensed teacher. Each teacher is to have working with her one student teacher or para-professional and one non-professional parent or community person. Each unit (of 54) is to have complete use of three standard contiguous classrooms. Two of the classrooms remain as presently structured for group instruction of 25 to 30 children at a time. The third classroom would have partitions constructed to provide cubicles varying in size from individual study carrels to small group instruction rooms for 3 to 9 children at a time.

Each unit of children and their teachers would remain together for approximately two years with children being admitted at each level (6-7,8-9,10-11) four times a year as children are judged by the faculty as being ready for the next level. Each school would consist of six or nine units depending on population needs. The school would be

headed by a head teacher or principal, whose major responsibilities would be educational leadership for the school, quality control and accountability. He would have two major assistants, one in charge of administrative affairs including maintenance, the supervision of non-professionals and feeding. The second assistant would concern himself with educational matters. His assignment would be within the classrooms rather than in an office. He would fill in for master teachers when they are absent, would take part in daily instruction and remediation and would coordinate in-service education of the teachers, para-professionals and sub-professionals.

Each elementary school would have a library for books and all other educational resources including film strips, films, records, etc. It should be staffed by two librarians, one whose major function would be to work with the teachers, supplying them with materials and the understanding how to use new and useful materials, the second to work directly with the children providing their needs for materials in individual projects or in group or class projects. They are to be assisted by a non-professional, preferably a man, who would take care of audiovisual equipment and make it available to teachers on request and assist in physical care of the library.

Each school would have a science teacher whose responsibilities would be to coordinate all science activities in the school, having all equipment and supplies necessary for a rich program. He would have a separate facility for housing materials and displays which would

be difficult to move from class to class, but would also give lessons weekly in each of the classes and supply the teachers with necessary materials and background to carry on the science lessons he initiates with their co-planning.

A physical education consultant would have a staff of three para-professionals and 6 to 9 selected high school students. This staff would be responsible for the recreational activities for recreation periods.

At each school there should be an Independent Study Center (ISC) available to all children in the school. Pupils would use the ISC as a resource where they could obtain advanced work and direction if they were moving ahead of the class to which they were assigned or special remedial help or modified curriculum materials if they were lagging behind. The Center staff would help with the study skills, would provide brief, intensive refresher or compensatory units of courses, assistance with special projects or individualized instruction as requested by pupils. The staff would also serve as a consultant resource to teachers.

A medical doctor on call, a full-time nurse, a full-time psychologist or psychiatrist, two social workers, one guidance person and a community coordinator would complete the cluster staff.

The present day strictures on curriculum would be lifted and master

teachers, teachers and central staff would have the responsibility for evolving an appropriate curriculum for each school which would result in the following outcomes:

1. Each child would have developed self-concept characterized by awareness of his worth as an individual and an awareness that his own behavior influences his present and his future.
2. Each child would have the social development which would make him comfortable in relating with peers and adults.
3. Each child would have the communication skills which would make it possible for him to express himself adequately at his age level in face-to-face conversation and in informal and formal reports to larger groups. He would also have the ability to listen attentively and to demonstrate a follow-up on what he has heard.
4. Each child would have the literacy competence expected of his age level. He should be able to read and enjoy reading, to comprehend increasingly more difficult materials. He should have the ability to write standard English.
5. Each child should be able to think in mathematical concepts and to do appropriate arithmetic computations for his level.
6. Each child should have an ever growing awareness of his relationship and man's relationship to his family, his neighborhood, his society, his school, his country and the world. The social studies curriculum would focus on the present, with the past being introduced where appropriate for reinforcement, but with the major purpose of preparing the child to function in tomorrow's world.
7. Each child should understand and be able to function in the use of

the scientific method and have an adequate content background in science for his level.

8. Each child should have experiences which provide a growing awareness of expressive and receptive art forms. Where talent can be developed, these experiences should also lead to the development of competence and skill in the art medium of his choice.

THE SECONDARY SCHOOL(S): Twelve through Seventeen Years of Age

The schools for the 12-17 year olds present certain problems at this time and in the near future because of the need to provide two approaches to education for disadvantaged youth. One program would provide for those students who had proceeded through the quality education program outlined above and were functioning at or beyond the expected level of performance. The second, however, would need to be heavily remedial in order to overcome the problems in learning which had been established through the experiences in today's schools and to overcome the serious deficiencies in basic skills and in content which are demonstrated by current measures of academic performance by a large percentage of the disadvantaged secondary school population.

All of the basic elements indicated at the elementary level would be continued into the secondary schools with several additions and organizational changes. We take no strong position in the present controversy concerning the relationship between junior and senior high schools, although we have some preference for keeping the 7th to 12th

grade classes within one building. This will again place accountability on the shoulders of one professional group for this six year span of education and will eliminate the projection of blame for failure onto a prior school organization.

School Organization

Realizing the advantages which can be derived from enlarged educational complexes at the secondary level, we are proposing the establishment of facilities to serve a large geographic area. This will provide for representation of broader social, ethnic and economic groups. Centralized facilities such as gymnasiums, theaters, swimming facilities and highly specialized academic centers could be provided to enrich the school experiences of these children. However, since anonymity is a serious problem in large installations of this kind, we propose that units or clusters be established for each group of 600 students, consisting of two units of 100 students at each of the following age levels, 12-13, 14-15 and 16-17. While current educational statistics indicate a drop off in attendance at the upper age levels, we are assuming that quality education will lead toward student retention through the 18th birthday. Each school could service any multiple of 600 and still give each student in the smaller units real and meaningful participation in decision-making in relation to his own activities and the welfare of the group.

Each 100 children would have four teachers, an English-speech instructor, a social studies teacher covering all the disciplines, a science teacher capable of teaching general science, earth science, astronomy, chemistry and physics at this level, and a math teacher. This would constitute the basic responsible unit of staff. They would be responsible for four classes among themselves preferably for the entire six year span. For each two units, that is for each eight classes totaling 200 children, the teaching staff would be augmented by a foreign language instructor, an art teacher, a music teacher, a physical education teacher, vocational and academic counselors and a battery of shops including carpentry, automobile, electronic, commercial, plumbing, electrical, etc. As at the elementary level, provision would be made for additional space for small group and individual study, the availability of rich library resources of materials and personnel, and an Independent Study Center would be available to each cluster.

The administration of a school of 1,200 students would be similar to the central administration at the elementary level, with the addition of a coordinator for work experiences and whatever staff would be needed to implement a work-study program.

Each child should be expected to participate in a work-study program in which he would be exposed to a graduated series of work experiences from his admission at 12 years of age to the secondary school until his completion of the program at the age of 18. The early phases of this

program should provide several hours of work a week at appropriate levels of remuneration. These should be exploratory in nature, affording each child several opportunities to learn from appropriate models in different institutions or organizations. The program should heavily involve the concept of apprenticeship, using skilled community resources wherever appropriate. The program should provide assistance for younger children and leadership roles for the 16 and 17 year olds in preparation for their transition to out-of-school employment or for higher education.

The school would be opened from breakfast through 10 P.M., providing periods for instruction, recreation, study and the work periods with flexible grouping and student selection of some units of learning. Units of study should be organized for short-term completion (6 to 8 weeks), providing frequent and periodic appraisal and review. Programs as agreed to by the central executive committee for the school would extend for six days a week and twelve months a year, including a period of camping.

CAMPING

Of the several possible approaches to extension of the influence and service of formal instruction, the use of camping offers unique opportunities. The change in pace, the change in setting, the esthetic values of nature, the intimacy of small group leadership and other advantages of camp life make this an untapped resource which

can be developed for compensatory education. In the model advanced, it is proposed that beginning with all 10 year olds a two-month-per-year camp experience be provided through the summer of the year of completion of high school.

The camp experience would be used to serve several purposes. The program would include a strong component of cultural enrichment with intensive exposure to arts, crafts, nature, trips, etc. Equal attention, however, would be given to personal social relationships, the identification and fostering of values and to contemplation and recreation. A third component of the camp program would be an extension of the Independent Study Center services. Aspects of the ISC would be available in camp with the study resources utilized in relation to pupil need and interest. Some pupil-campers would be doing supplementary and advanced studies. Some would be doing remedial work. Some would concentrate on refresher units. Others would be doing special projects designed to extend specific competencies or to compensate for specific deficits in knowledge or skill.

The camp season which could run from late spring through early autumn, April to October in the Northeast, should run concurrently with the extended school year. Grouping patterns should provide for age group mixing and certainly accommodate ability group mixing. Camper to counselor ratio should not exceed 7-1, yet opportunities for larger and smaller group activities must be available. Camp facilities need not be elaborate but should be adequate to protect health and safety.

Health and food services should permit special or remedial treatment for children with chronic diseases or nutritional problems. For some young people hosteling and other combinations of camping and travel should be provided. For some, apprenticeships in nature-related industries should be developed. For youngsters of advanced high school age, work as counselor aides and other working camping experiences should be provided. For the recent high school graduate, the camp season might be used for an introduction to post high school study or work.

An as yet unresolved problem relates to parental involvement in this aspect of the child's education.

SECTION III: Estimated Cost

The accurate estimation of the cost of establishing a nationwide system of compensatory or quality education for all disadvantaged children is a task which will require more time, money and resources than the nation is likely to allocate for that purpose at this time. Based upon the experiences of several school districts and projections by groups which have struggled with this problem, it is possible to arrive at crude estimates which suggest the magnitude of this undertaking.

If we define the disadvantaged primarily and realistically in terms of family income, we may be talking about 30,000,000 to 35,000,000 individuals of all ages. The Office of Economic Opportunity has taken both family size and urban and rural factors into consideration in establishing annual cash income thresholds to poverty. Some selective figures from their present criteria are:

Family size Persons	Non-farm	Farm
2	$1990	$1390
5	$3685	$2580
7	$4635	$3245
10	$6135	$4295

Using these criteria, O.E.O. provides the following information for children and youth:

Persons in Poverty

Age	Millions	% of poor who are non-white	% of all poor and non-poor in this age group
Under 6	5.8	40	24
6-15	8.1	38	21
16-21	3.0	30	17

The total of almost 17 million children and youth then form the hard core of the poverty group. It is patent, however, that the group of disadvantaged children and youth to whom the educational establishment is relating extends far beyond this number. Since these income figures are minimal, factors such as one parent families, father absence, inadequate housing, physical malfunction, malnutrition, and others are not taken into consideration. One fourth to one fifth of all young people are in the poverty group. Many others must be considered disadvantaged when we include educational criteria.

We should establish as a minimum educational goal for 14-18 year old youth, with moderate intelligence and limited background, that our education system bring them to the level of demonstrating basic skills in reading and arithmetic equivalent to the expectation at the 8th grade level, with commensurate content acquisition for that level. We then present a base upon which each young man and woman can be ready for either apprenticeship or vocational education to equip him or her with the knowledge and skills required for full employment as an adult. Every child then, at younger age levels, should be considered disadvantaged if his academic development is not progressing at a rate which will

assure the accomplishment of 8th grade academic achievement by ages 14-18. Each of these criteria is measurable. We have purposely eliminated from our statistical estimates criteria such as educational background of parents, housing conditions, and behavioral disorders because of difficulty in securing appropriate measures. Included in these projections is the small proportion of youngsters from backgrounds of poverty who nevertheless are making acceptable progress in school. For them as well as for all children our proposed organization for instruction must compensate for deficiencies and complement their assets. In designing the program we have not segmented the statistics by farm and non-farm population or by white and non-white population, because we assume that compensatory education in the United States must serve all children who require it.

Taking 50% of the population at each age level as operating at or below grade level and reducing that by 10% representing the mentally retarded and seriously physically handicapped, or other children needing intensive professional attention, we can establish a forty percent overall figure. The figure of 10% is used by the armed services in screening out men for their special Project 100,000. The 10% therefore will not be reflected in our budget; however, the federal government will need to make provision for these children. The budget for these purposes would probably exceed the per capita figures indicated in this report.

It would perhaps be justified if we were to include in the target

population all non-white children in the United States, since their education is routinely retarded by factors of discrimination beyond the problems faced by the poor. Another group requiring special attention, but not included as a special group, are children above the poverty level with language difficulties and/or cultural or social deficiencies resulting from geographic isolation or from limited resources of home and community. If we were to include these children and youth we would need to add another 5% to each category of persons. The following total population requires compensatory education. We have rounded figures to represent the annual average for the period 1967-1970.

		Total
Birth to 2 years of age	5,000,000	5,000,000
3-5 years of age	5,000,000	5,000,000
6-7 years of age	3,200,000	
8-9 years of age	3,200,000	
10-11 years of age	3,000,000	9,400,000
12-13 years of age	3,000,000	
14-15 years of age	2,500,000	
16-17 years of age	2,500,000	8,000,000
18-19 years of age	3,000,000	3,000,000
		30,400,000

In the review of compensatory education programs by Gordon and Wilkerson per pupil cost for isolated and at times limited special programs ranged from $25 per pupil to more than $1,000 above basic educational costs. The average for the more active and better rated ancillary programs would be approximately $500 per child. These programs were modest in design and in effect, yet to apply them to the entire target population would cost $15 billion per year over current costs for 30 million children. This does not provide for additional basic costs for children under 6 years of age not presently served by the education system. None of these programs approximate the intensity, comprehensiveness and quality of the programs we have proposed. From evaluation reports of many of these programs, we could not anticipate the desired results from this limited additional financial investment.

Another way of establishing this budget is to take the average per pupil expenditure in our more advanced school systems and to add to it the amount needed for quality education. Exclusive of capital investment and of federally funded programs the average per pupil cost in five of these systems ranges from $700 to $1200. The round figure of $1000 per child represents a nine to ten month school year, five days a week, from 9 A.M. to 3 P.M. Considering:

1. the lengthening of the school day from 8A.M. to 6 P.M. or 10 P.M. at the different age levels,
2. the inclusion of a sixth school day each week,
3. the need to further improve teacher salaries and working conditions, with upgrading for the master classroom teacher,

4. the need to enhance the technical preparation and employment circumstances of the para-professional and the non-professional,
5. the funds required for inservice refreshment and enhancement of teacher competence,
6. the reduced adult-pupil ratios,
7. the addition of nutritional, health, medical and social services,
8. the urgency of continuing intensive research and evaluation,
9. the desirability of multiple and varied programs and activities for involving parents and community representatives in the education of these children,

the lowest defensible estimate for the ten month program is $2500 per child or youth each year exclusive of capital investment or about $75 billion. The summer program providing care for the young children for the two months of the summer and camping for two months for the older children and youth would cost about $600 per individual for a total of $18 billion.

The monetary supplements for the work program at the secondary level should provide $15 to $30 a week per youth from 12 through 17 years of age. We assume that the income for the 18-19 year olds would come from industrial or other sources. These supplements for 8 million youths would total approximately $8 billion.

To summarize the budget, therefore, we must take:

1.	the expensive capital investment needed to provide adequate facilities	
2.	cost of school program	$75 billion
3.	cost of summer program	$18 billion
4.	monetary supplements for work program	$8 billion
		$101 billion

Since this budget relates only to the 30.4 million disadvantaged children, and since all children in our country are entitled to this high quality level of education, it is clear that this figure must be extended to educate 77 to 80 million children and youth under 20 years of age. In addition, higher education of equal quality should be provided for all those who qualify for advanced study.

SECTION IV: Is Compensatory Education the Answer?

It can be argued that no price is too high to pay for good and effective education for all of our children. In a cost-conscious society, however, social programs are judged in relation to economy of operation. Given our concern with improving or even optimizing educational achievement for poor and minority group children and in considering the economics of compensatory education, we might ask the question: "Is the most effective approach one which involves major and extensive innovations in curriculum content and school organization?" The data presently available to us indicate that most of the things we know how to do and have been willing to apply to improve education are of modest help to the target population. These efforts do not represent substantive changes in quality nor have they resulted in greatly improved academic performance. On the other hand, a much less complex innovation, economic and racial integration in the schools, seems to be associated with more substantial gains in quality of functioning in the target groups. If we are forced into a choice between compensatory education as currently practiced and school integration it appears that school integration, at our present level of knowledge and practice, is the treatment of preference.

To dichotomize this issue, however, may be an error. One should not be forced to choose the treatment which will provide the greatest gain, but rather the treatments necessary to achieve the goal. There is increasing conviction that just as compensatory education alone

may be insufficient, ethnic integration in the school may also be insufficient. In many instances where movement toward integration has been achieved, further separation by race or economic group has nonetheless followed as pupils have been grouped on the basis of their present achievement. Clearly, where youngsters come to a learning situation with different backgrounds and different degrees of readiness, we have no choice but to institute educational programs which build upon and compensate for their functional characteristics. At the same time, since we know that a large measure of pupil functioning seems to be influenced by non-cognitive factors related to the social-psychological circumstances under which they study, the school also has responsibility for the manipulation of those circumstances to serve the learning needs of pupils. In this instance, the provision of learning experiences in the context of culturally, economically and ethnically integrated pupil groupings is indicated.

Even if compensatory education could do the job, several leaders have cautioned against dropping the demand for integration. They feel it is only the threat of racial integration which will lead the white majority to provide the resources we need to do an acceptable job of compensatory education. We recall that it was the threat of racial mixing that pushed the Southern schools of the 1940's and 1950's to equalize at least the educational facilities available to Negroes. We wish that this estimate of the nation's values in this area were wrong. But given the immorality of our destructive "defense" of autocracy and corruption masquerading as "democracy" in Vietnam, the inhumanity of

our pursuit of that military victory, and the financial drain and waste involved in that military effort, the disadvantaged of our nation would be wise to expect little gratuitous assistance. Equalizing educational opportunity is not yet a priority goal in our country.